
**UNITED STATES DISTRICT COURT
EASTERN DISTRICT OF VIRGINIA
Alexandria Division**

WEB3AI TECHNOLOGIES, LLC,

Case No. _____

Plaintiff,

COMPLAINT FOR

v.

1) Patent Infringement

MICROSTRATEGY, INCORPORATED,

Complaint Filed: May 1, 2025

Defendant.

Plaintiff Web3AI Technologies, LLC (“**Web3AI**” or “**Plaintiff**”), for its Complaint against Defendant MicroStrategy Incorporated (“**MicroStrategy**” or “**Defendant**”), alleges as follows:

PARTIES

1. Plaintiff Web3AI Technologies, LLC is a limited liability company organized under the laws of the State of Utah, with its principal place of business in Utah. Web3AI is the owner by assignment of U.S. Patent No. 9,218,574, titled “User Interface for Machine Learning,” and has the right to sue and collect damages for past and present infringement of that patent.

2. Defendant MicroStrategy Incorporated is a corporation organized under the laws of Delaware, with its principal place of business at 1850 Towers Crescent Plaza, Tysons Corner, Virginia 22182. MicroStrategy regularly conducts business in this District, including by maintaining its corporate headquarters and developing, marketing, and offering its software products and services to customers in Virginia and nationwide.

JURISDICTION AND VENUE

3. This is an action for patent infringement arising under the patent laws of the United States, Title 35 of the United States Code. The Court has subject matter jurisdiction over this action pursuant to 28 U.S.C. §§ 1331 and 1338(a).

4. MicroStrategy is subject to this Court's specific and general personal jurisdiction. MicroStrategy has continuous and systematic business contacts within Virginia and within this District. MicroStrategy's headquarters and primary place of business are in this District, and MicroStrategy has committed acts of patent infringement in this District (as alleged below) and has purposely availed itself of the privilege of conducting business in this District, including by providing infringing products and services to customers located in Virginia.

5. Venue is proper in the Eastern District of Virginia under 28 U.S.C. §§ 1391(b)-(c) and 1400(b). MicroStrategy resides in this District within the meaning of § 1400(b) by virtue of its incorporation in Delaware and its regular and established place of business in Tysons Corner, Virginia, where it has headquartered its operations. MicroStrategy has committed acts of infringement in this District, including making, using, selling, and/or offering for sale infringing products and services from its Tysons Corner facilities and elsewhere in this District. Accordingly, both personal jurisdiction and venue are proper in this Court.

THE PATENT-IN-SUIT (U.S. PATENT NO. 9,218,574)

6. U.S. Patent No. 9,218,574 (the “**‘574 patent’**”), entitled “User Interface for Machine Learning,” was duly and lawfully issued by the U.S. Patent and Trademark Office on December 22, 2015. A true and correct copy of the ‘574 patent is attached hereto as **Exhibit A**. Web3AI is the sole owner of all right, title, and interest in the ‘574 patent.

7. The ‘574 patent resulted from pioneering work by inventors in Utah at

PurePredictive, Inc., who recognized early on the need for more interactive and accessible machine learning tools. The patent has an effective priority date of May 29, 2013, predating the recent surge in artificial intelligence and machine learning innovations. By virtue of an assignment recorded with the USPTO, Web3AI now owns the ‘574 patent and holds all rights to enforce it.

8. The ‘574 patent describes novel systems and methods that provide a user-friendly interface for machine learning processes. In general, the patented technology enables users to adjust input parameters for a machine learning model and immediately see updated results, thereby making machine learning outputs dynamically accessible. For example, the patent discloses an input module to receive user input (such as a value for a machine-learning parameter), a display module to show one or more machine learning results for the chosen parameter value, and an update module that automatically refreshes the displayed results in response to additional user input (i.e., when the user changes the parameter). To achieve instantaneous updates, the patent further teaches a pre-compute module that pre-calculates or caches various permutations of the machine learning results in advance, so that new results can be retrieved without delay when the user provides new input.

9. For example, claim 1 of the ‘574 patent is directed to an apparatus comprising these coordinated modules: (a) a *predictive compiler module* configured to generate machine learning program code for multiple learned functions (e.g., training different models) to predict results based on one or more parameters; (b) an *input module* for receiving user-specified values for the parameters; (c) a *pre-compute module* for determining, in advance of user input, potential results across a range of parameter values; (d) a *display module* for initially displaying a set of predicted results corresponding to a user’s selected parameter value from the precomputed data;

and (e) an *update module* for dynamically updating the displayed results when the user provides additional input (for instance, changing the parameter value). These modules are implemented in hardware or software (non-transitory computer-readable medium) executing on a processor.

10. Example dependent claims of the ‘574 patent provide additional details, such as caching the precomputed results in a data structure for quick retrieval (claim 2), using that cache to look up updated results (claim 3), displaying underlying dataset attributes and impact metrics (claim 4), utilizing multiple types of machine learning models (claim 5), suggesting recommended results to the user even before input (claim 6), and allowing both inputs and outputs of the model to be treated as adjustable parameters (claim 7), among others.

11. In short, the ‘574 patent provides a framework for an interactive machine learning interface in which users can explore “what-if” scenarios or ask iterative questions, and the system will dynamically update the machine learning outcomes in real-time. This improves the usability of machine learning by eliminating the lag between user interactions and seeing the analytical results.

12. The invention of the ‘574 patent marked a significant improvement in the field of machine learning interfaces. By enabling dynamic, real-time updates of predictive analytics results based on user interaction, the patented system enhances user engagement and comprehension of machine learning outcomes. A user can iteratively tweak inputs (for example, adjusting a slider or entering different query values) and instantly observe changes in predicted results, without waiting for lengthy retraining or re-computation. The precomputation and caching of results means the system can deliver new insights “on the fly,” which is especially valuable in business intelligence and data analytics scenarios where decision-makers need timely answers. The ‘574 patent’s approach bridges the gap between complex machine learning

algorithms and end-users who require fast, intuitive access to predictions and insights

13. The invention enables users to explore machine learning outputs by dynamically adjusting parameters and receiving updated results without significant delay, which is an improvement over the prior art.

DEFENDANT’S KNOWLEDGE OF THE PATENT-IN-SUIT

14. On December 2, 2024, Plaintiff, through its counsel, sent a letter to Defendant identifying the ‘574 Patent and notifying Defendant of its infringement of the ‘574 Patent. A true and correct copy of this letter is attached hereto as **Exhibit B**.

15. The letter included presentation slides explaining how the claims of the ‘574 Patent are relevant to Defendant’s MicroStrategy AI Platform.

16. Despite receiving notice of its infringement, Defendant has continued to infringe the ‘574 Patent.

17. Defendant has knowledge of the ‘574 Patent and its infringement thereof at least since receiving the December 2, 2024 letter.

MICROSTRATEGY’S ACCUSED PRODUCTS AND ACTIVITIES

18. MicroStrategy’s Platform. MicroStrategy is a well-known provider of business intelligence (BI) and analytics software. In recent years, MicroStrategy has integrated advanced artificial intelligence (AI) and machine learning features into its flagship platform (commonly referred to as MicroStrategy ONE or the MicroStrategy AI platform). These features are designed to enhance data analysis by allowing users to interact with data in more natural and dynamic ways, including the use of natural language queries and real-time predictive analytics.

19. In approximately September 2024, MicroStrategy introduced a suite of AI-driven capabilities as part of its platform update (the “**September 2024 release**”). This included a

virtual AI assistant named “Auto,” which provides generative AI functionality and a conversational interface for data analysis.

20. Through the Auto assistant and related features (such as Auto Answers and Auto Narratives), MicroStrategy’s platform allows users to ask questions about their data in plain English and receive instant, dynamically generated answers and insights. MicroStrategy touts that frontline business users can simply “type a question” about data and Auto will “provide an instant response” drawn from the organization’s data, delivered in an intuitive format.

21. These AI features are offered via MicroStrategy’s cloud environment and can be embedded in MicroStrategy’s dashboards, reports, and even third-party applications (through what MicroStrategy calls HyperIntelligence), enabling on-demand analytics across various user interfaces.

22. The accused MicroStrategy products (the “**Accused Products**”) include at least MicroStrategy’s AI-powered analytics platform and associated services that incorporate the “Auto” generative AI functionality. This encompasses features branded by MicroStrategy as Auto, Auto Answers, Auto Narratives, HyperIntelligence with Auto, and any other component of the MicroStrategy ONE platform that provides an interactive user interface for machine learning or AI-driven results. These features are made available to MicroStrategy’s customers through MicroStrategy’s cloud service (MicroStrategy Cloud / MicroStrategy ONE) and through on-premises software updates, and they operate in conjunction with MicroStrategy’s core analytics engine (often referred to as the MicroStrategy Intelligence Server).

23. The Accused Products provide a user interface for machine learning results that embodies each element of one or more claims of the ‘574 patent, including at least claim 1. In particular, MicroStrategy’s AI interface (via the Auto assistant and related UI components)

allows users to interactively input parameters and obtain responsive machine-learning-generated results in real time. By way of example, when using MicroStrategy's Auto Answers feature within a dashboard or chat interface:

- The system presents an input interface (such as a text prompt or filter control) where the user can specify a query or select a value that influences a machine learning analysis. For instance, a user might type an analytical question (e.g., "What will our predicted sales be if marketing budget increases by 10%?") or adjust a filter on a dashboard to focus on a certain scenario. This corresponds to an input module receiving one or more user-provided parameter values.
- Upon receiving the user's input, MicroStrategy's backend invokes its AI engine (including the Auto generative AI model and any underlying machine learning algorithms integrated with the platform) to generate one or more results. This may involve running predictive models on enterprise data or formulating a narrative answer using a large language model. The AI engine essentially serves the role of a predictive compiler, producing predictive results (e.g., forecasted sales figures, recommended actions, confidence metrics, or explanatory text) based on the user's input parameters. MicroStrategy has highlighted that its platform can leverage machine learning libraries or models behind the scenes to produce such insights.
- The platform then displays the machine learning results to the user through the interface. For example, Auto Answers might return a numerical result (like a projected sales figure) along with a natural language explanation, which is shown on the user's screen. In a dashboard scenario, the visualization (such as a chart or narrative) updates to reflect the outcome for the selected parameter value. This corresponds to the display module of the '574 patent showing the results for the identified parameter input. MicroStrategy's Auto Narratives feature, for instance, converts complex data into clear summaries within dashboards and keeps the information current based on user selections and filters== thus presenting the results relevant to the user's input.
- MicroStrategy's system pre-computes and/or caches results to enable the instantaneous response it delivers to users. The MicroStrategy platform is known to utilize in-memory caches and pre-aggregated data (through its Intelligence Server, caching mechanisms, or semantic graph) so that user queries can be answered with minimal latency. In the context of Auto Answers and dynamic dashboards, the platform likely has prepared underlying analytical results (or machine learning model outputs) for various potential inputs ahead of time. This preparatory step is functionally equivalent to the pre-compute module described in the '574 patent—ensuring that permutations of results are determined in advance (or very quickly, or on the fly) so that the system can retrieve and display the appropriate result immediately when the user makes a request.
- If the user provides additional input or modifies their query, the displayed results update dynamically without significant delay. For example, after seeing an initial answer, the

user might refine the question or change a filter (such as adjusting the “marketing budget” parameter from 10% to 20%). In response, MicroStrategy’s interface will swiftly recalculate or fetch the new prediction and refresh the display to show the new results – all during the same user session and in essentially real time. This behavior corresponds to the update module of the ‘574 patent, which dynamically displays a second set of results when the input module receives an additional value for the parameter. MicroStrategy’s own descriptions emphasize that its AI features allow users to get “on-demand AI insights” and explore data by asking successive questions, with the platform providing answers immediately as users delve deeper. Likewise, the Auto Narratives feature automatically changes the displayed narrative based on user preferences and filters, keeping information current and relevant, which exemplifies the real-time update of results when inputs change.

24. Through the combination of features above, the Accused Products meet every limitation of at least claim 1 of the ‘574 patent. More specifically, the MicroStrategy AI platform with Auto and Auto Answers comprises an apparatus that includes: (a) a predictive engine (Auto’s generative AI model and underlying analytics) configured to produce machine learning results (predictions and insights) based on enterprise data and user-specified parameters; (b) an input component that accepts user queries or parameter selections; (c) a precomputation mechanism via caching/semantic graph that pre-calculates possible outcomes or stores results for quick lookup; (d) a display interface that presents the results for the user’s chosen parameters; and (e) an update mechanism that refreshes the displayed results in response to further user input, near-instantaneously. On information and belief, additional asserted claims of the ‘574 patent are also infringed by MicroStrategy’s products. For example, the platform’s use of cached results corresponds to claim 2’s limitation of caching predetermined permutations of results in a data structure, and the rapid lookup of answers for different user inputs corresponds to claim 3. To the extent MicroStrategy’s AI features present various attributes (such as key drivers, confidence levels, or recommended actions) as part of the output, those functionalities map to claim 4 and claim 9 (which cover displaying attributes, goals, confidence metrics, etc., as part of the results).

25. MicroStrategy, by making, using, testing, demonstrating, marketing, offering for sale, and/or selling the Accused Products in the United States, has directly infringed and continues to infringe one or more claims of the ‘574 patent, in violation of 35 U.S.C. § 271(a). MicroStrategy’s infringement is literal or, to the extent certain elements are performed by equivalent structures or processes in its products, under the doctrine of equivalents. Each time MicroStrategy’s platform is used to accept user inputs and provide dynamically updated machine-learning results (for example, each time a MicroStrategy customer uses the Auto Answers feature to get an instant answer to a data question), the system as a whole embodies the patented apparatus and performs the patented methods. Such use by MicroStrategy itself (including use in providing demonstrations, trials, and cloud services) directly infringes the ‘574 patent. Additionally, to the extent MicroStrategy’s customers or end-users practice the patented system by using the Accused Products, those acts are also attributable to MicroStrategy (for instance, through MicroStrategy’s control and provisioning of its cloud platform).

26. Since at least the launch of its AI features, and certainly since receiving express notice of the ‘574 patent, MicroStrategy has also indirectly infringed the ‘574 patent by actively inducing infringement under 35 U.S.C. § 271(b). MicroStrategy encourages and facilitates its customers’ direct infringement of the ‘574 patent through the use of the Accused Products. MicroStrategy promotes the use of features like Auto Answers and Auto Narratives in its marketing materials and user guides, instructing customers on how to ask questions in natural language and obtain immediate results within its platform. MicroStrategy provides technical support and documentation that teach users to utilize these infringing features in an intended and expected way. For example, MicroStrategy’s official tutorials include topics such as “Using Auto Answers” and “Using MicroStrategy AI Bots”, which guide customers to employ the exact

functionality that reads on the patented interface. MicroStrategy does so with knowledge of the ‘574 patent (or willful blindness to it) and with the specific intent to induce its users to infringe. MicroStrategy derives profit and commercial benefit from customers using the platform’s AI capabilities in an infringing manner, and it has taken no steps to design around or discourage infringing uses. Accordingly, MicroStrategy is liable for induced infringement as well.

27. MicroStrategy’s infringement of the ‘574 patent has been and continues to be willful. Web3AI (directly) put MicroStrategy on notice of its infringement of the ‘574 patent by sending a letter to MicroStrategy identifying the ‘574 Patent and how the Accused Products infringed. Despite this knowledge, MicroStrategy has continued its infringing activities unabated and continues to integrate the infringing functionality as a key component of its product offerings. MicroStrategy’s ongoing infringement in the face of an objectively high likelihood that its actions constitute patent infringement demonstrates a deliberate disregard of Web3AI’s patent rights. Web3AI therefore alleges that MicroStrategy’s infringement is willful and egregious, entitling Web3AI to enhanced damages under 35 U.S.C. § 284.

Count I – Infringement of U.S. Patent No. 9,218,574

28. Web3AI repeats and re-alleges the allegations of the paragraphs above as if fully set forth herein.

29. MicroStrategy has infringed and is infringing the ‘574 patent by making, using, selling, offering to sell, and/or importing within the United States products and services that practice one or more claims of the ‘574 patent, including but not limited to claim 1. The Accused Products and functionalities identified above are non-limiting examples that meet each and every limitation of one or more claims of the ‘574 patent.

30. By operating its MicroStrategy ONE platform with the AI/Auto features enabled

(and by providing that platform to end users), MicroStrategy itself directly performs the patented methods and/or operates the claimed apparatus. To the extent any claim requires involvement of multiple components or actors, MicroStrategy controls or directs the performance of all required steps and elements. Thus, MicroStrategy is liable for direct infringement of the '574 patent under 35 U.S.C. § 271(a).

31. The Accused Products include “a predictive compiler module configured to generate machine learning comprising program code for a plurality of learned functions.” Specifically, MicroStrategy’s Auto feature generates queries that execute on the MicroStrategy platform, running business logic and rules specific to an organization.

32. The Accused Products include “an input module configured to receive user input identifying one or more values for the one or more machine learning parameters.” Specifically, MicroStrategy allows users to enter natural language queries such as “What’s the projected sales for the next quarter?” to identify values for machine learning parameters.

33. The Accused Products include “a pre-compute module configured to predetermine, using the generated machine learning, permutations of the machine learning results at one or more increments between a minimum value and a maximum value for the one or more machine learning parameters, prior to the input module receiving the user input.” Specifically, MicroStrategy pre-computes machine learning results before receiving specific user inputs, as evidenced by its ability to generate time-series forecasts with specified parameters.

34. The Accused Products include “a display module configured to display, from the pre-compute module, a first predetermined permutation of the one or more predicted machine learning results for the one or more identified machine learning parameters.” Specifically, MicroStrategy’s Auto Answers displays forecast charts and visualization of machine learning

results based on user queries.

35. The Accused Products include “an update module configured to dynamically display, from the pre-compute module, a second permutation of the one or more machine learning results in response to the input module receiving additional user input identifying one or more additional values for the one or more machine learning parameters.” Specifically, MicroStrategy allows users to ask follow-up questions without needing to retype the original forecast request and without recalculating the forecast.

36. The Accused Products include the requirement that “the predictive compiler module, the input module, the pre-compute module, the display module, and the update module comprise one or more of logic hardware and a non-transitory computer readable storage medium storing program code executable by a processor.” Specifically, MicroStrategy operates in an environment that includes one or more of logic hardware and a non-transitory computer readable storage medium storing program code executable by a processor, such as for example, a cloud environment on AWS, Microsoft Azure, or Google Cloud Platform.

37. Additionally, MicroStrategy indirectly infringes the ‘574 patent by inducing infringement by its customers and end users. MicroStrategy has actively and knowingly induced infringement of the ‘574 patent under 35 U.S.C. § 271(b) by encouraging its customers to use the Accused Products in their ordinary, intended manner—which as described above results in the practice of the patented interface for machine learning. MicroStrategy had knowledge of the ‘574 patent at least by December 2, 2024, and has known that the normal and customary use of the Accused Products by its customers infringes the ‘574 patent. With that knowledge and intent, MicroStrategy engages in affirmative acts to induce infringement, such as advertising the infringing capabilities of its software, providing guides and technical support instructing users to

utilize those capabilities, and hosting workshops or demonstrations that show customers the benefits of the AI-driven interface. MicroStrategy does so specifically to encourage adoption of its platform and increased usage of the exact features that infringe, and it thereby induces users to infringe the '574 patent. As a result, MicroStrategy is liable for induced infringement.

38. At no time has Web3AI licensed or otherwise authorized MicroStrategy to practice the inventions claimed in the '574 patent. MicroStrategy's infringing acts are without permission or legal right.

39. MicroStrategy's infringement of the '574 patent has caused injury to Web3AI. Web3AI has suffered damages in an amount to be proven at trial, including at least a reasonable royalty due to MicroStrategy's unauthorized use of Web3AI's patented technology. Web3AI has also suffered and is continuing to suffer irreparable harm due to MicroStrategy's infringement, for which there is no adequate remedy at law, such that injunctive relief is warranted to prevent further unauthorized use of the patented technology.

PRAYER FOR RELIEF

WHEREFORE, Plaintiff Web3AI respectfully requests judgment in its favor and that the Court grant the following relief:

1. A judgment of infringement of one or more claims of the '574 patent;
2. An award of damages adequate to compensate Web3AI, including enhanced damages for willful infringement;
3. A permanent injunction or ongoing royalty against continued infringement;
4. Attorneys' fees under 35 U.S.C. § 285;
5. Costs and interest as allowed by law; and
6. Such other and further relief as the Court deems just and proper.

DEMAND FOR JURY TRIAL

Pursuant to Rule 38 of the Federal Rules of Civil Procedure, Web3AI demands a trial by jury on all issues so triable.

DATED this ____ day of _____ 2025.

WEB3AI TECHNOLOGIES, LLC

/s/ _____
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